AMENDMENTS TO THE CLAIMS

The following listing of claims will replace all prior versions, and listings, of claims in the application:

1. (Original) A method for electrodeposition of copper on a noble metal layer of a work piece, the method comprising the steps of:

exposing the noble metal layer to an electrodeposition composition, said electrodeposition composition comprising a copper salt, a suppressor, an accelerator and an electrolyte;

initiating electrodeposition of copper on a surface of the noble metal layer by application of a predetermined current density to the work piece; and

terminating said initiating electrodeposition upon the occurrence of a predetermined event.

2. (Original) The method of claim 1, the step of initiating electrodeposition of copper comprising subjecting said noble metal layer to a current density no greater than 40 mAmps/cm^2.

3. (Original) The method of claim 2, the step of initiating electrodeposition of copper comprising subjecting said noble metal layer to a current density no greater than 20 mAmps/cm^2.

4. (Original) The method of claim 1, the step of initiating electrodeposition of copper comprising subjecting said noble metal layer to at least one of a constant current, a constant voltage, a modulated current and a modulated voltage.

5. (Original) The method of claim 1, the step of exposing the noble metal layer to said electrodeposition composition comprising exposing to said electrodeposition composition a layer of at least one of ruthenium, rhodium, palladium, osmium, iridium and platinum.

6. (Original) The method of claim 1, said suppressor having a cloud point, the method further comprising selecting an electrodeposition temperature, and, if said cloud point is greater than said electrodeposition temperature, the step of exposing comprising exposing the noble metal layer to said electrodeposition composition having an anion present in an amount sufficient to lower said cloud point to approximately no greater than said electrodeposition temperature.

7. (Original) The method of claim 6, the step of exposing comprising exposing the noble metal layer to said electrodeposition composition having at least one anion selected from the group comprising chloride ions, bromide ions, iodide ions and sulfate ions.

8. (Original) The method of claim 1, said suppressor having a cloud point, the method further comprising the step of selecting an electrodeposition temperature and the step of exposing comprising exposing the noble metal layer to said electrodeposition composition having said suppressor formulated so that said cloud point matches said electrodeposition temperature.

9. (Original) The method of claim 1, the work piece having a feature and a field region and the step of exposing comprising exposing the noble metal layer to said electrodeposition composition that is formulated so that, upon the step of initiating electrodeposition of copper, the rate of deposition of the copper within said feature is greater than the rate of deposition of the copper on said field region.

10. (Original) The method of claim 1, wherein the work piece has a first field region adjacent a feature having a dimension of at least 2 μm and has a second field region adjacent a feature having a dimension of less than 2 μm, and wherein the step of exposing comprises exposing the noble metal layer to said electrodeposition composition formulated so that said suppressor exhibits preferential adsorption on said first and said second field regions.

11. (Original) The method of claim 1, the step of exposing comprising exposing the noble metal layer to said electrodeposition composition having said suppressor that comprises a wetting agent.

12. (Original) The method of claim 1, the step of exposing comprising exposing the noble metal layer to said electrodeposition composition having said suppressor comprising a block copolymer of ethylene oxide and propylene oxide.

13. (Original) The method of claim 1, the step of exposing comprising exposing the noble metal layer to said electrodeposition composition having said suppressor comprising at least one selected from the group comprising Pluronic®, Pluronic® R, Tetronic®, and Tetronic® R surfactants.

14. (Original) The method of claim 1, the work piece having a first feature with a dimension of at least 2 μm wide and having a second feature with a dimension of less than 2 μm, wherein the step of exposing comprises exposing the noble metal layer to said electrodeposition composition formulated so that said accelerator exhibits preferential adsorption within said first and said second features.

15. (Original) The method of claim 1, the step of exposing comprising exposing the noble metal layer to said electrodeposition composition having said accelerator comprising at least one sulfur atom.

16. (Original) The method of claim 1, the step of exposing comprising exposing the noble metal layer to said electrodeposition composition having said accelerator formed of one of a metal salt of 2-mercaptoethane sulfonic acid and a metal salt of 3-mercaptopropane sulfonic acid.

17. (Original) The method of claim 1, the method of electrodeposition comprising a method for electroplating.

18. (Original) The method of claim 1, the method of electrodeposition comprising a method for electrochemical mechanical deposition.

19. (Original) The method of claim 1, wherein the step of initiating electrodeposition of copper results in the deposition of a copper metallization layer on the work piece and the step of terminating comprises terminating the step of initiating

electrodeposition of copper when said copper metallization layer has a thickness in the range of about 500 to about 3000 angstroms.

20-70. (Cancelled)